

IN THE CLAIMS:

Please find below a listing of all of the pending claims. The statuses of the claims are set forth in parentheses.

1. (Currently Amended) A remote-controllable time-based power control apparatus, comprising:

a remote controller (1) provided with keys to set an operating time of an electronic appliance and to wirelessly transmit setting information for the operating time to a control means (3) connected to a plug (2), the remote controller (1) including a display unit (12) and a signal tone generating unit (13) for visually and aurally informing a user of power control information transmitted from the control means (3), wherein the power control information includes a remaining operating time and a power ON/OFF state;

the plug (2) for supplying power to the electronic appliance; and

the control means (3) including a wireless transmitting unit (31) and a wireless receiving unit (32) for communicating wireless data including the power control information with the remote controller (1), a memory (35) for storing therein registered code information of the remote controller (1) and preset operating time information transmitted from the remote controller (1), a clock generating unit (36) for generating clock signals at regular time periods, a direct current (DC) power unit (38) for converting an alternating current (AC) power input to the plug (2) into a Direct Current (DC) power and supplying the DC power as an internal drive power, an MPU (42) for performing real-time counting by counting the clock signals generated by the clock generating unit (36) and outputting the power control information having the remaining operating time and the power ON/OFF state, and a control signal to shut off the power when a counted value is identical with the preset operating time

transmitted from the remote controller (1) and stored in the memory (35), whether the counted value is identical with the preset operating time transmitted from the remote controller being determined by comparing the counted value with the preset operating time, a power control unit (40) for controlling a transistor (Q1) to be turned on/off in response to the control signal output from the MPU (42), and the transistor (Q1) turned on/off in response to a control signal output from the power control unit (40) to turn off a relay switch (41) connected to a power line at one end of the plug (2), the control means (3) controlling the electronic appliance to be automatically turned off after the electronic appliance has been operated for the preset operating time transmitted from the remote controller (1).

2. (Previously presented) The remote-controllable time-based power control apparatus according to claim 1, wherein:

the control means (3) further comprises a load detecting unit (39) arranged on an output side of the relay switch (41) to detect a load due to the operation of the electronic appliance; and

the MPU (42) recognizes that the electronic appliance is operated only when the load detecting unit (39) detects a load, and counts an actual operating time by counting the clock signals generated by the clock generating unit (36).

3. (Previously presented) The remote-controllable time-based power control apparatus according to claim 1, wherein:

the control means (3) further comprises a low voltage detecting unit (37) for detecting an abnormal fluctuation in the power input to the plug (2) and providing the detected results to the MPU (42); and

the MPU (42) is reset after storing a value, obtained by counting an actual operating time until a voltage fluctuation signal is input from the low voltage detecting unit (37), in the memory (36), and then continuously counting a remaining operating time on the basis of the operating time counting value stored in the memory (35) after being reset.

4. (Currently Amended) The remote-controllable time-based power control apparatus according to claim 1, wherein the control means (3) wirelessly transmits the remaining operating time of the power plug (2) and the ON/OFF status information of the power to the remote controller (1), the information being displayed on the display unit (12) of the remote controller (1).

5. (Previously presented) The remote-controllable time-based power control apparatus according to claim 1, wherein the control means (3) transmits a predetermined alarm signal to the remote controller (1) in response to a remaining operating time being less than a predetermined time, and outputting an alarm through the signal tone generating unit (13) of the remote controller (1).

6. (Currently Amended) A remote-controllable time-based power control apparatus, comprising:

a remote controller provided with keys to set an operating time of an electronic appliance and to wirelessly transmit setting information for the operating time to control means connected to a plug, the plug supplying power to the electronic appliance, the remote controller including a display unit and a signal tone generating unit for visually and aurally informing a user of power control information transmitted from the control means, wherein the power control information includes a remaining operating time and a power ON/OFF state; and

the control means including a wireless transmitting unit and a wireless receiving unit for communicating wireless data including the power control information with the remote controller, a clock generating unit for generating clock signals at regular time periods, an MPU for performing real-time counting by counting the clock signals generated by the clock generating unit and for outputting the power control information having the remaining operating time and the power ON/OFF state, and a control signal to shut off the power to the electronic appliance in response to a counted value being identical with a preset operating time transmitted from the remote controller by comparing the counted value with the preset operating time, the control means controlling the electronic appliance to be automatically turned off after the electronic appliance has been operated for the preset operating time transmitted from the remote controller.